

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 24, 25 and 29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Calmettes et al. (US 4834431) in view of JP 8-61315 and Krausz (US 5271648).

Calmettes et al. (figures 1-3) teaches clamping collar structure comprising a V-shaped band with housings 2a incorporated into the bearing tabs 2. The bolt head 3 has the same shape as the abutment spacer 5 (col. 3, lines 20-35) and such a configuration prevents rotation of the bolt head and spacer through its cooperation with the housings 2a and V-shaped band. The difference is that the spacer isn't formed by a rolled-up blank with the inside perimeter having a channel whose height is clearly greater than the diameter of the bolt. However, the use of a rolled-up blank for the spacer is conventional as shown by JP 8-61315 (figures 1-5) which teaches the use of a rolled-up spacer 13 as providing sufficient strength between the bolt head and bearing tab in the environment of a clamping collar while Krausz (figure 2) teaches clamping collar structure with spacer plates 3, 4 having openings 8 therein twice as large as the bolt so that as the tightener brings the bearing tabs together, the bolt 6 moves in the openings 8 so as to better secure the fastener with less stress. It would have been obvious to modify the clamping collar of Calmettes et al. so that the spacer is a rolled-up blank in view of JP 8-61315 teaching such structure to be a conventional expedient with a simply devised and shaped

configuration and to provide a channel therein to permit the bearing tabs to adjust as they are brought together as is taught by the openings 8 in the spacer plates 3, 4 of the clamping band of Krausz.

Allowable Subject Matter

Claims 4-6, 10-12, 14, 16-23 and 26-28 are allowed.

Claim 30 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Response to Arguments

Applicant's arguments with respect to claims 24 and 25 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to JAMES R. BRITTAIN whose telephone number is (571)272-7065. The examiner can normally be reached on M-F 5:30-2:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Victor Batson can be reached on (571) 272-6987. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/James R. Brittain/
Primary Examiner, Art Unit 3677

JRB